ELASTICITY AND SOUND BANKING.

BY FREDERICK A. CLEVELAND, PH.D., PROFESSOR OF FINANCE IN THE SCHOOL OF COMMERCE, ACCOUNTS AND FINANCE, NEW YORK UNIVERSITY.

FROM 1897 to 1901, the promotion of enterprise which promised large return on capital ventured was the dominant thought. In the language of President McKinley, these were "times of appalling prosperity." Coincident with the sale of securities based on speculative estimates of future income, was an enormous expansion of credit—*i.e.*, dealings on promises or contracts for the future delivery of money. Speculative securities were used as a basis for bank-credits; bank-credits in turn were used to make larger purchases of materials; the commodity market, bounding to a new and higher price level, gave larger book-profits, which again were reflected in judgments of increased valuation of resources, as a basis for a still further expanding credit. The prominent feature of what we came to know as "prosperity" was a remarkable swelling of the asset side of the balance-sheet.

In 1901, conditions began to be reversed. Many of the promises made for prospective large gains in income from speculative venture remained unfulfilled, and a more conservative judgment began to scale former estimates of valuation. The asset side of the balance-sheet of the buying public began to shrink, while liabilities in the form of credit, by the very nature of contracts made, continued to increase. It was this latter condition that revived the demand for elasticity.

There are two ways in which credit liabilities may be met, viz: by "payment" and by "settlement." *Payment* is the satisfaction of a credit-*obligation* by delivery of the amount of money contracted for. *Settlement* is the satisfaction of a contract for future delivery by a new contract or acceptance, in lieu of de-

livery or payment. Ability to *pay* depends on the ownership or possession of money, or something which may be converted into cash, for delivery when the credit-contract is due and demand is made; ability to *settle* depends on the power of the one obligated to offer something which will be acceptable to the creditor in lieu of legal-tender money.

In campaigns for currency and banking reform, these two methods of satisfaction of credit-demands have been the first premises of two opposing schools of financial thinking. Recurring periods of relapse from speculative excess, cycles of decreasing assets and proportionately increasing liabilities, have caused issue to be joined between them. The school which have pleaded for reform based on ability to *pay,* have styled their argument a plea for financial "soundness." The school which have urged measures for *settlement,* without being required to fulfil their contracts for future delivery of money, have been characterized by their opponents as "inflationists." But, whatever may be chosen as terms to properly represent these two financial creeds, it must be recognized that each is an attempt to solve the problem of liquidation—the one, by the introduction of methods which will insure a larger proportion of assets to credit issued, the other, by a provision for new issues of credit liabilities to meet those already outstanding. It may be further observed that, in all of these contests, the one school have stood for the strict fulfilment of existing contracts, and have sought to protect business against the evil of *future* excesses of credit-issue, while the other have sought to obtain relief from a *present* emergency, arising out of demands made for the delivery of money on existing contracts of credit.

In 1893-6, attempt was made to solve the problem of liquidation by establishing 371.5 grains of silver as the standard for payment of existing liabilities and for the valuation of assets. With the price of silver as it then stood, this device would at once have doubled the proportion of assets to credit liabilities, and would have made liquidation easy. Two successive political campaigns recorded victory for the gold standard; and all future doubt as to the ability of the Government to liquidate its credit-money obligations, by *payment* according to the standard, was set at rest by *increasing the assets* of the Government available to meet gold demands. These questions are now considered settled, but a new

period of liquidation brings with it a similar controversy with respect to the credit-accounts of commercial banks. On questions of public policy, opinion is again divided between the same schools, representing the same ideals that have contested for supremacy throughout the last two centuries.

A restatement of their respective demands may lend clearness to the presentation of contending faiths. To give greater facility to the liquidation of bank-credit liabilities, the one school argue: (1) For authority to issue new promissory notes in *settlement* of credit-accounts outstanding; (2) for a first lien on the general assets of the bank to secure the ultimate *payment* of these notes; (3) for the abolition of the Sub-Treasury; (4) for the "deposit" of all revenues of the Government in the commercial banks, without collateral security; (5) for the right of banks to establish branches, without requiring a proportionate increase of capital-reserves to liabilities.

The arguments offered in support of these several demands are in brief as follows: (1) That authority to issue notes will relieve the banks from the necessity of obtaining legal-tender money for delivery in time of unusual demand for liquidation of bank-credit, and will thus relieve extraordinary pressure on the money market; (2) that a first lien on the general assets of the bank to secure the ultimate *payment* of notes issued in *settlement* of outstanding credit-accounts, will keep the bank-note as "sound" as the issues of the Government, and will protect it as well as if secured by a deposit of Government bonds; (3) that the abolition of the Sub-Treasury system will prevent money being abstracted from the regular channels of trade when there is a surplus of Government revenue over expenditure; (4) that by "depositing" the revenues of the Government with the commercial banks, these "deposits" may be used to support still larger volumes of credit-accounts, and increase the available funds of the community; (5) that by a system of branch-banking, capital will be given greater "fluidity,"—*i.e.*, the money of the bank may flow from one part of the country to another as it may be needed.

Answering these contentions, the other school of banking opinion urge that all this is a plea directed towards weakening the capital-resources of the banks on the one hand, and for permission to avoid *payment* of credit-accounts outstanding on the other. Further enlarging on these views, they argue that authorization to

issue new notes in *settlement* of demands for delivery of money made on account, is a means of avoiding *payment,* and in its effect not only prevents such a readjustment of assets to liabilities as is necessary to sound banking, but tends toward a still larger inflation of credit, at the very time when assets are being scaled by the exercise of more conservative judgments of valuation—*i.e.,* when their ability to convert assets into cash for delivery on credit-demands is being reduced. It is also pointed out that the security offered for note-issues, in the form of a lien on the general assets, not only decreases the need of capital-resources, but at the same time tends to weaken still further the support to bank credit-accounts—the kind of funds in most general use,—and to weaken public confidence in the whole banking system. They urge that the Sub-Treasury, instead of being an element of weakness, is an element of strength in two ways: *first,* by segregating the public funds, the necessity for larger bank capitalization is increased; and, *second,* by storing up an independent reserve in time of low money-demand, an independent money-reserve is at hand which may be made available to the banks in time of monetary strain. In support of this last contention, they point to the wholesome influence of the Sub-Treasury in the recent disturbances, such as the Baltimore and St. Louis panics, at which times the bank situation might have proved disastrous to the business of the whole country, had it not been for the aid of the Government.

As to the so-called "deposits" of Government moneys in the banks, they show that these are nothing more or less than loans to the banks without interest. In this relation, it is further urged that the only reason why any one should purchase a bank-account is to obtain funds for current use in a form more convenient than money; that the only need of the Government for such funds is represented in the accounts of disbursing officers—about $6,000,000. They hold, therefore, that the ever-increasing loans of the Government to the banks (at present amounting to about $170,000,000) put a premium on their relying on the paternal support of the Treasury, instead of depending on their own capital-resources for the cash needed in the liquidation of their own accounts—*i.e.,* for money reserves. Again, it is urged that the demand for branch-banking is inspired by this same motive—the desire for still further lessening the capital cost of doing business, which, if accomplished, would result in again

weakening the need for capital contributions by the stockholding proprietors of banking corporations.

This second school would secure elasticity in quite another way. Their first principle is expressed by Mr. James G. Cannon, who says:

"Bankers sometimes plead for more elastic currency, but what is needed is more elasticity of the assets of the bank; what is wanted are *assets* that are readily convertible into cash in time of panic, which will *pay* depositors, and at the same time permit new loans."

This statement sets out in strong relief the irreconcilable premises of the two classes of thinkers; the one urging a right to *increase liabilities* still further when their assets are inadequate to support outstanding demand-credit; the other urging *an increase in the capital-assets*—those assets readily convertible into cash without curtailing loans.

According to the manner of thinking of this latter school, the purpose of capitalization of a bank (as in all other business enterprises) is to provide the funds necessary to procure permanent equipment. The financial process called "capitalization" is the creation of a permanent fund for permanent use. The reason for obtaining funds for permanent equipment by capitalization, is to avoid the necessity of constantly seeking temporary relief in refunding a need which is continuous. The permanent need of a commercial banking institution is a need for money, or other assets readily convertible into money, as a means of supporting outstanding credit-accounts to customers.

The business of banking is that of furnishing "current-funds" to its customers, in the form of non-interest-bearing credit of the bank. The customer obtains these credit-funds by exchanging for them his own interest-bearing notes, or other forms of bankable assets. The earnings of a bank are chiefly derived from using these non-interest-bearing credit obligations to purchase good commercial paper at a discount or at interest. The amount of earnings depends, in large measure, on the amount of good commercial paper the bank is able to buy with its credit-accounts—*i.e.*, profits depend on the amount of credit-accounts (so-called "deposits") purchased by customers for use as current-funds by means of their own interest-bearing obligations.

The capitalization of banks, therefore, should be sufficient to support and protect their credit-purchases of all good commercial

paper offered by customers, and when present equipment is inadequate to do this the demand should be met by increased capitalization or the organization of new banks. In other words, the bank should stand ready at all times to purchase all good paper offered by those who carry so-called deposits, and they should have capital-resources large enough to meet all demands for money on the credit-accounts so created and issued to customers, without restricting or rediscounting loans. *Capitalization* should be sufficient to meet every *money-demand* on the credit business done.

If there were no variations in the amount of credit used, then a money equipment large enough to meet the constant money-demands on credit-issues, pending voluntary liquidation of loans and discounts, would be the amount of equipment needed. But the fluctuations of demands for current bank-credit are wide; the money-demands are always a variable quantity. They come from the shifting prosperity of customers; they come also from the fluctuating demands of ordinary business in the community from season to season. It is found by experience, however, that the demands for current-funds (*i.e.*, the amount of good commercial paper and other bankable assets offered to the bank in exchange for accounts), varies with considerable regularity. In highly mercantile communities, the experience of a bank may show a recurring ebb and flow of credit four times a year—the largest demands coming semi-monthly; in certain agricultural communities, there is a rise and fall twice per year; in others, as in the Cotton States and in parts of Canada, the loans and accounts cumulate and are reduced by voluntary liquidation only once in twelve months. There is, therefore, in the experience of banks in different communities a definite basis for a close approximation to capital equipment needs. The amount of capital needed under such circumstances, unless the bank intends regularly to shift the burden by rediscount, is an amount that will provide a safe money-reserve for the support of the largest volume of credit-accounts (so-called "deposits") carried during the year.

No greater fallacy ever existed in banking circles, however, than the one so often employed—that a certain percentage of "cash" to "deposits" is the only equipment necessary to sound banking. This form of reasoning has led to strange results. In time of minimum money-demand, the money-reserves are allowed to run low in proportion. By assuming that this is the only form of

equipment needed, the bank has no resources from which more money may be realized when demands are larger, except by calling in loans or restricting accommodations.

The wide variations of demands for money made from time to time on the accounts of customers make two forms of equipment advantageous, viz.: (1) a legal-tender "money-reserve" of such amount as will enable the bank to meet all *ordinary* money-demands; (2) an "invested capital-reserve" which will produce an investment revenue when money-demands are *small,* but which may readily be converted into cash to meet *extraordinary* money-demands, without forcing the bank to sell its commercial paper assets or call in its loans.

By those who advocate a system of "banking on the capital-resources of the bank," it is urged that there are two ways of realizing on "unencumbered capital investments," viz.: (1) They may be *sold* for cash, and the proceeds of the sale added to the "money-reserves," or (2) they may be *hypothecated* in time of need, thus at once obtaining the desired cash and retaining an equity of redemption in the investment. Of these two methods, hypothecation is the best form of conversion to meet pressing demands, as there may be a loss of invested principal on forced sales even where the investment is in United States bonds. Sales, on the other hand, are the better forms of conversion when a favorable market is found—*i.e.,* for the gradual conversion of assets to permanently increase the amount of capital-resources carried in the form of money-reserve. Since elasticity depends on the ability of the bank to obtain money to meet sudden demands or to support a sudden increase in customers' accounts, the principle of elasticity will best be served by investing the surplus capital-resources of the bank in a form of assets that may be readily *hypothecated,* and in keeping these investments unencumbered. This last feature cannot be too much emphasized; the "invested reserve," to be available for any purpose (by sale or by hypothecation), must remain *unencumbered.*

Proceeding from an ideal of capital-resources (in the forms of money-reserves and of investments convertible into cash) adequate to meet all demands for *payment* on credit-accounts outstanding, this second school have a very different programme of reform and elasticity to propose: (1) They would maintain the Sub-Treasury system in its integrity, for the same reasons which

led to its foundation, viz., to compel the banks to do business on their own capital; and if at any time the surplus-money-reserve becomes too large, it is urged that this may be corrected by payment of Government obligations or by reduction of revenue. (2) They would give to the banks a note-issue privilege, as a means of providing increased facilities for the *hypothecation* of the "invested reserve"; but they would require that the banks receive notes from the Government only on the condition of satisfactory collateral deposited—the same condition as would be imposed if they were applying to a Clearing-House for an issue of Clearing-House certificates, to tide over an emergency. (3) As an inducement to adjustment of the volume of credit business to the capitalization provided for its support, they would require that interest be paid on these issues, somewhat above the usual commercial rate, as is the custom of Clearing-Houses. (4) In time of panic, they would strengthen the financial situation by making the Government surplus available to banks through the hypothecation of unencumbered capital-resources, again charging a rate of interest adequate to force the bank back on its own resources as soon as the extraordinary emergency had passed. (5) They would take away from the banks the privilege of loaning (selling) their money to other banks and of still counting this as a part of their money-reserve; by a repeal of the "reserve-deposit" clause of the present law, it is pointed out, the banks would be made still further to rely upon their own capital, as they would be required to invest their surplus money-reserves in capital-resources convertible into cash, without shifting the money-demand on their reserve again, causing them to restrict their credit-accommodations to customers. (6) They would erect a permanent fund for the insurance of customers'-accounts, by cumulating the income derived from the tax on issues and from interest on Government loans.

These proposals are based on the notion that the most important class of funds to be protected is the bank account—the class of funds with which over ninety per cent. of our business is transacted; that the capitalization should be adequate to protect these as well as such notes as may be issued, and that, in so far as notes are issued, they should be regarded as emergency issues of the Government made through the banks to meet the relatively small fluctuating commercial need for money, as a basis for which the

bank should provide capital-assets. They contend that the "loans and discounts" should not be encumbered for the security of notes, but that, on the other hand, when loans are paid to the bank, the fund thus created should be available to liquidate credit-accounts outstanding; that, in addition to having "money-reserves," "unencumbered capital-resources" and the "loans and discounts" to support its outstanding credit-accounts, the interest and taxes paid by the bank on loans (secured by hypothecation of capital resources as a means of obtaining cash to protect its reserves, when securities owned cannot be *sold* to advantage) should go to create a common fund to insure the credit-accounts sold by the banks to the community for current use in business. With such a system of "banking on the capital-assets of the bank," it is conceived that our credit-funds would have an elasticity adequate to meet every extraordinary demand, and that it would be as sound as the gold-standard currency of the Government.

The present contest for sound banking is but a logical sequence of national experience and sound political reasoning. It is a known fact that the amount of money needed and actually used in business is almost constant. The fluctuation for any period of three months (the longest period for which arrangements are usually made for current-funds), has been less than five per cent. from the gradually increasing mean, or average, money supply. Mr. Ridgely recently pointed out that, of this amount (which at present is something over $2,700,000,000), from fifty-three to fifty-five per cent. was constantly in circulation among the people; while from forty-five to forty-seven per cent. is regularly held in the vaults of the banks and of the Treasury. The annual expenses of national Government amount to about $500,000,000. As a means of providing current-funds for its use, it is estimated that at least $100,000,000, or twenty per cent., should be kept on hand as available cash. Besides this amount, the Government by law is required to keep $150,000,000 in gold as a money-reserve for the redemption of about $1,200,000,000 of its credit-money-issues outstanding; this, in turn, by the law of May 14, 1900, is supported by a first lien on all moneys in the general fund in the Treasury, by a first lien on all revenues, and by the ability of the Government to obtain gold through bond sales.

From thirty-two to thirty-three per cent. of the total money in use is in the vaults of the banks for the support of some $9,000,-

000,000 of credit-accounts. It has long been a settled conclusion in American thought, that the money of the country can be best protected in its physical and financial integrity by the Treasury—an institution organized to protect the public welfare, instead of being conducted for private gain. For the fluctuating money demand it has been recognized, however, that some provision should be made, and that this can best be done through those private commercial institutions where the demand is first felt. It is with respect to this fluctuating demand only, that an elastic medium is needed. But since the need is one of protecting the credit-accounts which the banks have sold to the community for profit, the conclusion seems to be a sound one that the banks should deal with the Government for the issue of this elastic medium, and that they should provide themselves with the capital-resources to make this money as sound as any other portion of the currency. It would further seem logical that, in granting to the banks such power to deal with the Government for money supply, they should not be allowed to impair the safety of the enormous issue of credit-accounts which they have sold to the public for current-funds. The banks have been permitted to engage in the business of selling credit-funds to the community for profit; the Government should require of them the same measure of public safety, by way of sound banking equipment, that it does in mining operations, transportation, manufacture, or other enterprise conducted for private gain.

FREDERICK A. CLEVELAND.